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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/852,931	05/10/2001	Xiaomei Wang	1081-US	5835
25263	7590	02/04/2003		
J GRANT HOUSTON AXSUN TECHNOLOGIES INC 1 FORTUNE DRIVE BILLERICA, MA 01821			EXAMINER	PATEL, TULSIDAS C
			ART UNIT	PAPER NUMBER
			2839	

DATE MAILED: 02/04/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No.	Applicant(s)
	09/852,931	WANG, XIAOMEI
	Examiner T. C. Patel	Art Unit 2839

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1) Responsive to communication(s) filed on \_\_\_\_.  
 2a) This action is FINAL.                    2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4) Claim(s) 1-20 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_ is/are allowed.  
 6) Claim(s) 1-20 is/are rejected.  
 7) Claim(s) \_\_\_\_ is/are objected to.  
 8) Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on \_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 11) The proposed drawing correction filed on \_\_\_\_ is: a) approved b) disapproved by the Examiner.  
 If approved, corrected drawings are required in reply to this Office action.  
 12) The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
 \* See the attached detailed Office action for a list of the certified copies not received.  
 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
 a) The translation of the foreign language provisional application has been received.  
 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

1) Notice of References Cited (PTO-892)                    4) Interview Summary (PTO-413) Paper No(s). \_\_\_\_.  
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)                    5) Notice of Informal Patent Application (PTO-152)  
 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_ .                    6) Other:

## DETAILED ACTION

### *General Status*

1. This is a First Action on the Merits. Claims 1-20 are pending in the case.

### *Claim Rejections - 35 USC § 102*

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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(e) the invention was described in-  
(1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or  
(2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

3. Claims 1-5, 7-17, 19 and 20 are rejected under 35 U.S.C. § 102(e) as being anticipated by Laor (US 6,097,860).

For claims 1, 14, 15 and 20, Laor, in figures 1-33, discloses a bench (figure 22), an user side interface 16 to an array of user fibers 12, a device side interface 18 to an array of device fibers that connects the module to a first device and a second device (in this case different fibers of 18), a monitoring signal generator 26 (figures 2 and 18), that generates monitoring signals 45 (figure 10), a monitoring signal detector 54, that detects the monitoring

signals, and a beam switching system (figures 18, 19) that selectively connects the user fiber to the device fibers for the first device or second device (also see figure 29).

For claim 2, fiber-mounting blocks for user side and device side fibers are disclosed in figure 22. For claims 3 and 4, lenses are disclosed in figures 19 and 30. For claim 5, a semiconductor device or diode for generating monitoring signal is disclosed in figure 19. For claims 7 and 8, tap detectors 48 (for input and output) are disclosed in figure 19. For claims 9 and 10, a moving mirror 98 to translate the beam is disclosed in figure 19. For claims 11 and 12, the translation of first to second state, for beam in perpendicular direction is generally shown in figure 1B. For claim 13, there is one tilt mirror array for input side and second tilt mirror array for output side.

For claim 16, beam splitter along with sensor assembly and array system are disclosed in figures 10 and 18. For claim 17 and 19, the substrate, etc. are disclosed in figures 20, 22.

### ***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 6 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Laor (US 6,097,860).

As discussed above, Laor satisfies the limitation of claims 1-6, 7-17, 19 and 20. However, Laor does not disclose lens for lens array for the generator array for monitoring signal and standoff for detector substrate. The collimator for focusing beams are discussed in column 15, lines 56-60 and figures 30A, 30B. Providing collimator for obtaining parallel beams is considered within the scope of ordinary skill in the art. In so far as standoffs recited in claim 18 are concerned, tit is considered a matter of design choice.

6. The prior art made of record and not relied upon is considered pertinent to applicant's invention. Gloeckner et al. (US 6,445,841), Hussain et al. (US 6,453,083) and Huibers et al. (US 6,337,760) all disclose optical switching system.,

Applicant also should consider these references in response to this office action. Should issue arise concerning the rejection presented above, these references may be relied upon in a subsequent action to support the lack of novelty or obviousness of claimed subject matter to one of ordinary skill in the art.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to T. C. Patel whose telephone number is (703) 308-1736. The examiner can normally be reached on 6:30-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lynn Feild can be reached on (703) 308-2710. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308-7722 for regular communications and (703) 308-7722 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-1736.

  
T. C. Patel  
Primary Examiner  
Art Unit 2839

tcp  
January 28, 2003